

State of California
Regional Water Quality Control Board
San Diego Region

EXECUTIVE OFFICER SUMMARY REPORT
September 10, 2003

ITEM NO. 7

SUBJECT: California Department of Transportation
San Joaquin Hills Transportation Corridor
Orange County (Tentative Addendum No. 1 to Cease and Desist
Order No. 2001-198) (*Christopher Means*)

PURPOSE: To consider adoption of tentative Addendum No. 1 to Cease and
Desist Order No. 2001-198.

PUBLIC NOTICE: A newspaper notice regarding tentative Addendum No. 1 to
Cease and Desist Order No. 2001-198 was published in the Orange
County Register on August 11, 2003. A copy of the tentative
Addendum was sent to the discharger (via certified mail) on
August 26, 2003. The Regional Board Agenda Notice was mailed
on August 22, 2003, and has been posted on the Regional Board
web page.

DISCUSSION: On July 18, 2001, the San Diego Regional Board issued Cease and
Desist Order No. 2001-198 (CDO) to the California Department of
Transportation (Caltrans) for causing and threatening to cause a
discharge of pollutants from the San Juan Hills Transportation
Corridor (SR-73), located in southern Orange County. Specifically,
the Regional Board concluded that Caltrans failed to use
reasonable care to properly operate and maintain its structural
treatment devices, Compost Stormwater Filters (CSF units) for
stormwater runoff. The CDO required Caltrans to repair or
replace the treatment units, implement measures to properly
maintain the units and conduct a water quality monitoring program
of to assess the pollutant removal capabilities of the units and their
associated detention basins.

In a letter dated July 30, 2003, Caltrans requested the rescission of
monitoring requirements contained in the CDO. Caltrans has
conducted two years of monitoring to determine the pollutant
removal capabilities of the current treatment units when properly
maintained. Based upon this data, the treatment units have not
performed up to design expectations. Consequently Caltrans
proposes to replace these units with other types of structural
BMPs. These BMPs are listed in supporting document No. 5.

Tentative Addendum No.1 will rescind monitoring requirements specified in Directive No. 4 of the CDO, and establish a final deadline of June 1, 2005 to complete the removal of the treatment units and the installation of alternative structural BMPs.

No comments on this item were received during the 30-day public notice period. Caltrans has agreed that the June 1, 2005 deadline for compliance with the CDO is reasonable.

LEGAL CONCERNS: None

COMPLIANCE RECORD: Since the issuance of Cease and Desist Order No. 2001-198, Caltrans has complied with all the directives of the CDO in a timely manner.

**SUPPORTING
DOCUMENTS:**

1. Addendum No.1 to Cease and Desist Order No. 2001-198
2. Compost Stormwater Filter unit monitoring site location map.
3. Cease and Desist Order No. 2001-198
4. July 30, 2003 letter from Caltrans requesting cessation of monitoring requirements.
5. Compost Stormwater Filter unit replacement schedule (attachment B of June 31, 2003 quarterly report)

RECOMMENDATION: Adopt tentative Addendum No. 1 to Cease and Desist Order No. 2001-198.

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN DIEGO REGION**

**TENTATIVE
ADDENDUM NO. 1**

**TO
CEASE AND DESIST ORDER NO. 2001-198
CALIFORNIA DEPARTMENT OF TRANSPORTATION
San Joaquin Hills Transportation Corridor (SR-73)**

The California Regional Water Quality Control Board, San Diego Region (hereinafter Regional Board) finds that:

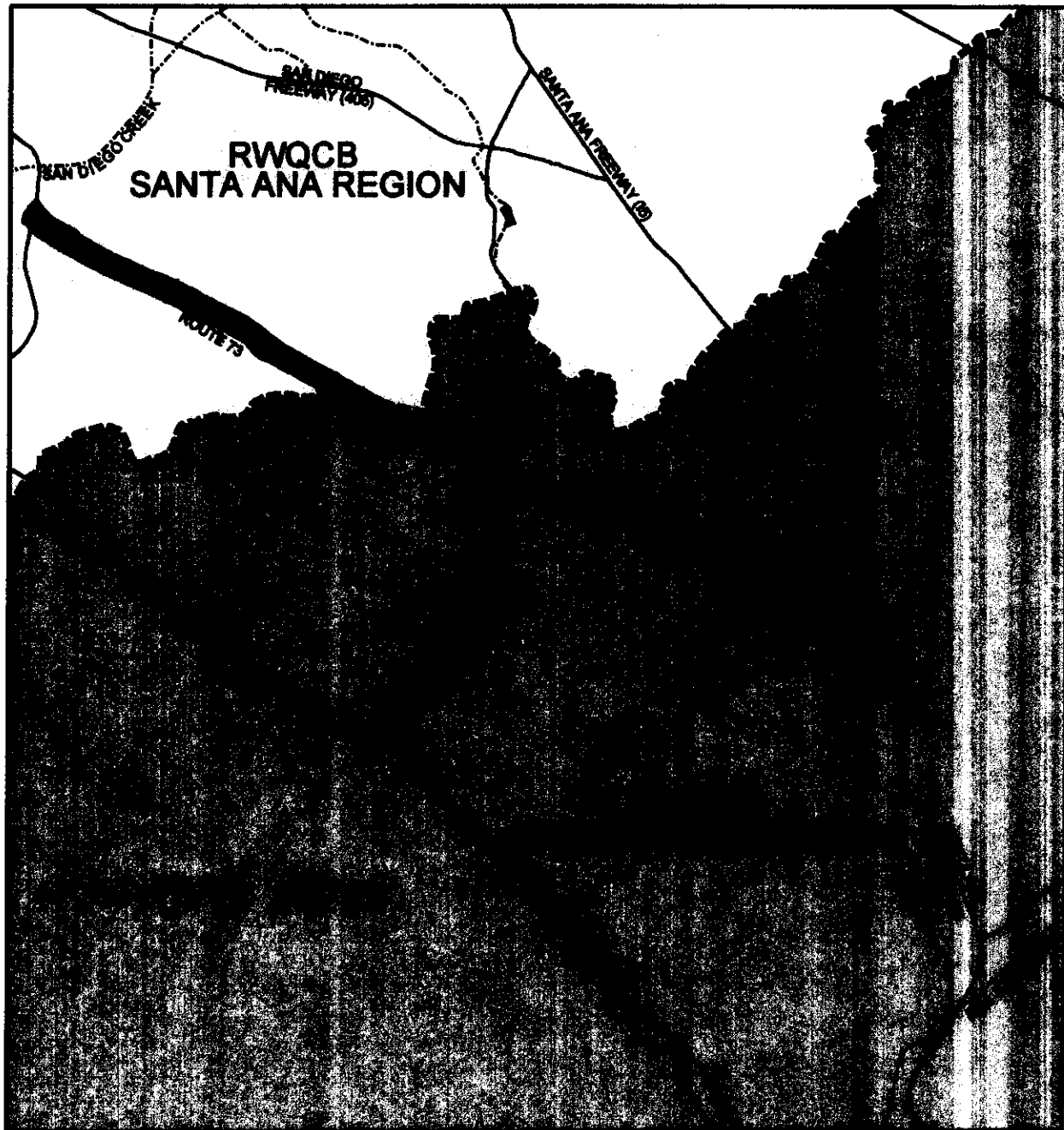
1. On July 18, 2001, this Regional Board adopted Cease and Desist Order No. 2001-198, finding that the California Department of Transportation (Caltrans) had failed to use reasonable care to properly maintain and operate the twenty Compost Stormwater Filters (CSF units) that were installed along the portion of SR-73 within the jurisdiction of the San Diego Regional Board, in violation of requirements contained in the Caltrans Statewide General Stormwater Permit, Order No. 99-06-DWQ.
2. This addendum establishes a deadline for Caltrans to complete a project that the agency has proposed to achieve compliance with the Cease and Desist Order. The project consists of replacing the twenty CSF units with suitable alternative structural treatment Best Management Practices (BMPs). The June 1, 2005 deadline is reasonable based upon the project's budget, complexity and the regulatory permitting process.
3. This addendum will also rescind the water quality monitoring requirements of Directive No. 4 of Cease and Desist Order No. 2001-198. Monitoring from the last two years has met the goals of Directive No. 4 by providing sufficient data to:
 - a. Establish a baseline for the quality of runoff generated from SR-73.
 - b. Establish that the pollutant removal capabilities of the CSF units are inconsistent.
 - c. Establish that the CSF units are contributing excess nutrients to receiving waters, but these nutrients do not seem to be impairing the water quality or beneficial uses of streams associated with SR-73
4. The Regional Board has notified Caltrans and interested agencies and persons of its intent to issue this Order and has provided them with the opportunity for a public hearing and to submit their written views and recommendations.
5. The SDRWQCB, in a public hearing, heard and considered all comments pertaining to this matter.
6. This enforcement action is being taken for the protection of the environment, and as such is exempt from the provisions of the California Environmental Quality Act (Public Resources Code, Section 21000 et seq.) in accordance with Section 15108, Chapter 3, Title 14, California Code of Regulations.

IT IS HEREBY ORDERED that, pursuant to Section 13301 of the California Water Code:

1. By June 1, 2005, Caltrans shall remove all CSF units on SR-73 within the jurisdiction of the San Diego Regional Board, and shall complete replacement of these units with the alternative structural treatment BMPs, as outlined in Attachment B of the Quarterly Progress Report submitted on July 31, 2003.
2. Directive No. 4 of Cease and Desist Order 2001-198 is rescinded.

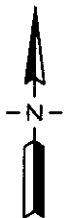
I, John H. Robertus, Executive Officer, do hereby certify the foregoing is a full, true and correct copy of an Addendum adopted by the California Regional Water Quality Control Board, San Diego Region, On September 10, 2003.

JOHN H ROBERTUS
Executive Officer



EXPLANATION

- CSF SYSTEM LOCATION
- CREEK
- ROAD
- SANTA ANA RWQCB
- SAN DIEGO RWQCB
- RWQCB BOUNDARY LINE



0 1 2
APPROXIMATE SCALE IN MILES

COMPOST FILTER MONITORING PROJECT LOCATION MAP
COMPOST STORM WATER FILTER SYSTEM MONITORING - STATE ROUTE 73
 Orange County, California

Date:
06/26/03

Figure
3

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN DIEGO REGION**

CEASE AND DESIST ORDER NO. 2001-198

CALIFORNIA DEPARTMENT OF TRANSPORTATION

San Joaquin Hills Transportation Corridor (SR-73)

The California Regional Water Quality Control Board, San Diego Region (hereinafter SDRWQCB) finds that:

1. The California Department of Transportation (Caltrans) owns and maintains the San Joaquin Hills Transportation Corridor (SR-73) located in southwest Orange County.
2. Caltrans discharges storm water and non-storm water runoff from the portion of SR-73 located within the San Diego Region; these are discharges regulated by waste discharge requirements currently contained in Order No. 97-08, NPDES No. CAS029998.
3. The State Water Resources Control Board has directed the SDRWQCB to rescind Order No. 97-08 and regulate Caltrans under statewide waste discharge requirements for the discharge of storm water and non-storm water for Caltrans municipal activities (highway systems), industrial activities (maintenance yards), and construction activities (construction projects) contained in Order No. 99-06-DWQ, of the State Water Resources Control Board (NPDES No. CAS000003).
4. The present and threatened violations of SDRWQCB Order No. 97-08 noted in this order are analogous to violations of the newly enforceable SWRCB Order No. 99-06-DWQ. Upon rescission of SDRWQCB Order No. 97-08, Caltrans will be in violation of the provisions of the statewide permit.
5. Caltrans has failed to use reasonable care to properly maintain and operate the twenty Compost Storm Water Filters (CSF units) that were installed along the portion of SR-73 within the jurisdiction of the SDRWQCB as the primary structural best management practice (BMP) for removal of pollutants in storm water runoff.
6. While CSF units can be effective in reducing many targeted pollutants in highway runoff, they require conscientious routine maintenance to function properly. Maintenance and repair of the CSF units including, but not limited to the following is necessary to restore these CSF units to their proper functioning:
 - a. The removal of trash and debris from filter surface and sediment forebay.
 - b. The removal of vegetation growing in compost media.
 - c. The removal of sediment covering compost media to restore a high infiltration capacity.
 - d. The replacement of compost media/ filter material as necessary to restore a high infiltration capacity.
 - e. The removal of trash, debris and excess sediment from sedimentation basins associated with the CSF units.

- f. The repair of any structural failures of the CSF units (e.g. baffles, energy dissipaters).
7. By failing to adequately maintain the twenty CSF units, Caltrans has caused and threatens to cause discharges of pollutants which have not been reduced to the Maximum Extent Practicable (MEP), violating **General Discharge Prohibition A.2** of SDRWQCB Order No. 97-08, and **General Discharge Prohibition A.1** of SWRCB Order No.99-06-DWQ.
 8. Due to the lack of adequate maintenance of the CSF units, Caltrans is in violation of **Standard Provision M.5** of SDRWQCB Order No.97-08, and **Provision M.4** of SWRCB Order No.99-06-DWQ. Caltrans has failed to at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by Caltrans to achieve compliance with the conditions of these orders.
 9. Due to the lack of adequate maintenance of the CSF units, Caltrans has violated and continues to violate **Storm Water Discharge Specification C.1** of SDRWQCB Order No. 97-08 by failing to implement controls to reduce the discharge of pollutants to the MEP from Caltrans owned right-of-ways to waters of the United States.
 10. By failing to adequately maintain the primary treatment BMPs on SR-73 Caltrans threatens to violate **General Discharge Prohibition A.4** of Order No. 97-08 and **General Discharge Prohibition A.3** of Order No. 99-06-DWQ by potentially contributing to pollution, contamination or nuisance conditions in waters of the United States.
 11. In establishing the directives specified in this Cease and Desist Order, this Regional Board considered a report from Caltrans that the CSF units may increase concentrations of nutrients (Nitrates, Nitrites, TKN, total & dissolved phosphorus) in the discharge and may not be an appropriate treatment technology for the SR-73. Further investigation of the CSF units pollutant removal capabilities are needed to ascertain whether the benefits derived from implementation of this treatment device outweigh the possible problems associated with the export of nutrients.
 12. The SDRWQCB has notified Caltrans and interested agencies and persons of its intent to issue this Order and has provided them with the opportunity for a public hearing and to submit their written views and recommendations.
 13. The SDRWQCB, in a public hearing, heard and considered all comments pertaining to this matter.
 14. This enforcement action is being taken for the protection of the environment and, as such is exempt from the provisions of the California Environmental Quality Act (Public Resources Code, Section 21000 et seq.) in accordance with Section 15108, Chapter 3, Title 14, California Code of Regulations.

IT IS HEREBY ORDERED that, pursuant to California Water Code Section 13301, the California Department of Transportation shall cease and desist from violating and threatening to violate RWQCB Order No. 97-08, and SWRCB Order No. 99-06-DWQ and shall comply with the following directives:

A. DIRECTIVES

1. Caltrans shall begin corrective action forthwith on all detention basins and CSF units along SR-73 located within SDRWQCB jurisdiction, to achieve compliance with Order No. 99-06-DWQ.
2. By August 31, 2001, Caltrans shall submit to the SDRWQCB a tentative schedule for the timely completion of the repairs to the detention basins and CSF units, or the replacement of these structures with a suitable alternative treatment BMP, along SR-73 within SDRWQCB jurisdiction.
3. Caltrans shall develop and implement an inspection and maintenance program for all detention basins and CSF units located within SDRWQCB jurisdiction. This inspection and maintenance program will be implemented forthwith. At a minimum all detention basins and CSF units within the jurisdiction of the SDRWQCB shall be inspected monthly. Minor and major maintenance of BMPs shall be performed as needed to ensure their proper functioning. All inspection and maintenance activities shall be documented.
4. By October 30, 2001, Caltrans shall submit a water quality monitoring plan to this Regional Board that satisfies the following requirements:
 - a. Determine the quality of highway runoff from SR-73.
 - b. Determine the ability of the CSF units & detention basins to remove pollutants of concern from runoff from SR-73.
 - c. Determine if the CSF units are contributing excess nutrients, resulting in the impairment of water quality and beneficial uses of receiving waters associated with SR-73.

At a minimum, the plan shall include the monitoring of influent and effluent discharges from CSF units within the jurisdiction of the SDRWQCB. The influent and effluent from the CSF units shall be monitored for but not limited to chromium, copper, lead, nickel, zinc, total dissolved solids, total suspended solids, nitrates, nitrites, total kjeldahl nitrogen, ammonia, total & dissolved phosphorus, oil & grease, total polycyclic aromatic hydrocarbons, fecal coliform, and total coliform. This plan will provide the location of each monitoring site, and the frequency of sampling events. The location of the monitoring sites will include sites within hydrologic sub areas 901.13 (Aliso Creek), 901.21(Oso Creek), and 901.12 (Laguna Canyon). Monitoring will continue until such a time that this Order is rescinded. Annual monitoring reports with the analysis results shall be submitted to the Regional Board.

5. Caltrans shall submit quarterly progress reports which will include:
 - a. A discussion of all tasks undertaken during the quarter to achieve compliance with the Directives of this Order.

- b. Documentation of the progress of all repairs to detention basins and CSF units along SR-73 within the jurisdiction of the SDRWQCB.
- c. A description of all maintenance and inspection activities associated with the detention basins and CSF units along SR-73 within the jurisdiction of the SDRWQCB.

The quarterly reports shall be submitted according to the following schedule:

REPORT PERIOD	REPORT DUE
April - June	July 31
July - September	October 31
October - December	January 31
January - March	April 30

B. PROVISIONS

- 1. Nothing in this Order shall be construed to relieve the California Department of Transportation from further enforcement action, including administrative or judicial assessment of civil liability, injunctive relief, or criminal prosecution, resulting from violations of SDRWCB Order No. 97-08, and SWRCB Order No. 99-06-DWQ.
- 2. The California Department of Transportation shall submit reports required under this Order to:

Northern Region Watershed Protection Unit
California Regional Water Quality Control Board
San Diego Region
9771 Clairemont Mesa Boulevard, Suite A
San Diego, CA 92124

I, John H. Robertus, Executive Officer, do hereby certify the foregoing is a full, true and correct copy of an Order adopted by the California Regional Water Quality Board, San Diego Region, on July 18, 2001.

JOHN H. ROBERTUS
Executive Officer

DEPARTMENT OF TRANSPORTATION

DISTRICT 12

3337 MICHELSON DRIVE, SUITE 380

IRVINE, CA 92612-8894

PHONE (949) 440-3440

FAX (949) 724 - 2019

SAN DIEGO REGIONAL
WATER QUALITY
CONTROL BOARD

July 30, 2003

2003 AUG -8 P 1:43

Mr. John H. Robertus, Executive Officer
California Regional Water Quality Control Board
San Diego Region
9174 Sky Park Court, Suite A
San Diego, CA 92123

Attn: Robert Morris

Subject: 2002-2003 Annual Monitoring Report / Cease and Desist Order NO. 2001-198 dated 7/20/2001

Dear Mr. Robertus:

Enclosed is our Annual Monitoring Report (CTSW-RT-03-036) dated June 2003, pursuant to the Directive No. 4 of the subject Cease and Desist Order (CDO) issued for the San Joaquin Hills Transportation Corridor (State Route 73). This report presents storm water monitoring data collected throughout the 2001/2002 and 2002/2003 wet season at three Compost Storm Water Filter (CSF) systems located within the hydrologic subareas of Aliso (System No. 604R), Oso (System No. 506R) and Laguna Creeks (System No. 785L). The Annual Monitoring Report for the 2001-2002 storm water season was submitted last year on October 3, 2002.

Based on the findings of these monitoring reports, it is evident that the CSF Systems export nutrients, demonstrating that these systems do not function as effective storm water Best Management Practices (BMPs). It is unlikely that additional monitoring of these CSF systems would yield different findings.

Therefore, the Department requests that the San Diego RWQCB determine that the objectives of monitoring the CSF units have been met, and remove this requirement from the CDO. The effort that would be spent on additional monitoring could then be better directed towards improving water quality by replacing the three CSF units with suitable treatment BMPs. As reported in the second quarterly report dated July 31, 2003, based on the site layout and hydrologic/hydraulic conditions, the Oso Creek site (System No. 506R) will be replaced with a Detention/Filtration treatment system, which will be monitored upon completion of construction. The Aliso Creek (System No. 604R) and the Laguna Creek (System No. 785L) sites, will be replaced with Storm Water Management Plan (SWMP) approved detention basins.

If you have any questions regarding this submittal, please contact Grace Piña-Garrett, NPDES Branch Chief at (949) 724-2189, or C.T. Bathala, Transportation Engineer at (949) 724-2994.

Sincerely,

For CINDY QUON

Director

District 12

Enclosure: Annual Monitoring Report dated June 2003

C: Michael Adackapara, Santa Ana RWQCB
Bruce Fujimoto, SWRCB, DWQ, Regulatory

CJM

State Route 73 Compost Storm Water Filter Systems -
Site Specific Replacement Schedule

Attachment B

CSF System	Track	Regional Board	Site-Specific Corrective Action	Estimated Date of Completion	Constraints/Comments
457L	I	San Diego	Alternative inlets and outlets - hold and release	Winter 2003	• Construction on schedule
508R	0	San Diego	Combined detention / filtration		• Corrective action selected - based on site layout and runoff hydrology / hydraulics. • Replacement not yet scheduled - CSF being monitored (CDO Directive No. 4) • Hydrologic Sub Area 901.21 (Oso Creek)
535L	I	San Diego	Alternative inlets and outlets - hold and release	Winter 2003	• Construction on schedule
583L	II	San Diego	SWMP detention basin	Winter 2004	• Project on schedule • Corrective action selected - based on site layout and runoff hydrology / hydraulics.
604R	0	San Diego	SWMP detention basin		• Corrective action selected - based on site layout and runoff hydrology / hydraulics. • Replacement not yet scheduled - CSF being monitored (CDO Directive No. 4) • Hydrologic Sub Area 901.13 (Aliso Creek)
613L	I	San Diego	Alternative inlets and outlets - hold and release	Winter 2003	• Construction on schedule
630L (CSF only)	II	San Diego	Phase III GSFD with sediment trap	Spring 2004	• Completion date adjusted to reflect coordination efforts with TCA on traffic-related design issues. • Archaeological monitoring required during construction.
636L	II	San Diego	SWMP detention basin	Winter 2004	• Project on schedule • Corrective action selected - based on site layout and runoff hydrology / hydraulics. • Negotiations for easement acquisition are on-going.
654R	I	San Diego	Alternative inlets and outlets - hold and release	Winter 2003	• Construction on schedule
659L	II	San Diego	SWMP detention basin	Winter 2004	• Project on schedule
698R (upstream of 659L)	II	San Diego	SWMP detention basin	Winter 2004	• Project on schedule. • Corrective action selected - based on site layout and runoff hydrology / hydraulics.
765L (2 nd basin upstream of 757L)	II	San Diego	Wet Basin	Winter 2004	• Project on schedule. • Archaeological survey prior to ground disturbing activities required. • Biological and noise monitoring may be required during bird nesting season due to adjacent mitigation and Conservation Habitat areas.
780R	I	San Diego	Alternative inlets and outlets - skimmer	Summer 2004	• Project on schedule. • Biological and noise monitoring may be required during bird nesting season due to adjacent mitigation and Conservation Habitat areas. • Archaeological monitoring may be required during construction.
785L	0	San Diego	SWMP detention basin		• Corrective action selected - based on site layout and runoff hydrology / hydraulics. • Replacement not yet scheduled - CSF being monitored (CDO Directive No. 4) • Hydrologic Sub Area 901.12 (Laguna Canyon)
789L	II	San Diego	SWMP detention basin	Winter 2004	• Completion date adjusted to reflect environmental coordination efforts. • Mitigation areas, wetlands, and wildlife crossing adjacent to site • Biological and noise monitoring may be required during construction

* Monitored CSF UNITS

**State Route 73 Compost Storm Water Filter Systems -
Site Specific Replacement Schedule**

Attachment B

CSF System	Track	Regional Board	Site-Specific Corrective Action	Estimated Date of Completion	Constraints/Comments
808R	I	San Diego	Alternative inlets and outlets – skimmer	Winter 2003	<ul style="list-style-type: none"> • Construction on schedule. • Biological monitoring continues, with no Cal. Gnatcatcher sightings to-date.
859L	I	San Diego	Alternative inlets and outlets – skimmer	Winter 2003	<ul style="list-style-type: none"> • Construction on schedule. • Biological monitoring continues, with no Cal. Gnatcatcher sightings to-date.
878R	I	San Diego	Alternative inlets and outlets – skimmer	Winter 2003	<ul style="list-style-type: none"> • Construction on schedule. • Biological monitoring continues, with no Cal. Gnatcatcher sightings to-date.
883L	I	San Diego	Detention basin optimization – bypass	Summer 2003	<ul style="list-style-type: none"> • Construction on schedule • Biological monitoring continues, with Cal. Gnatcatchers observed near the site.
893L	I	San Diego	Detention basin optimization – bypass	Summer 2003	<ul style="list-style-type: none"> • Construction on schedule • Biological monitoring continues, with Cal. Gnatcatchers observed near the site.